

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (Currently Amended) A substrate inspecting method to be executed between a first component mounting step of mounting a predetermined type of ~~part on a printed circuit board and a second mounting step of mounting a component on a position with no component mounted of the substrate undergoing the first component mounting step, wherein~~ component on a substrate and a second component mounting step of mounting another component on a mounting area of the substrate on which no component is mounted in the first component mounting step, the method comprising:

~~it is inspected on a~~ inspecting the ~~substrate undergoing that has undergone~~ the first component mounting step, to determine whether or not the [[a]] component mounted in the first component mounting step is properly positioned so as to at least cover the mounting area for the another component to be mounted in the second component mounting step included in a region corresponding to the component mounting position in the second component mounting step.

2. – 8. (Canceled)

9. (New) A substrate inspecting method for inspecting a component previously mounted on a substrate, the method comprising:

- a) inspecting the component previously mounted on the substrate by fly inspection, to determine whether or not the component mounted is improperly mounted so as to at least partly cover a mounting area for a component to be mounted at a later point in time,
- b) if it is determined by the step a) that the component is improperly mounted, outputting an error signal to signify that the component needs to be removed and remounted.

10. (New) The substrate inspecting method according to claim 9, further comprising:

c) if it is determined by the step a) that the component is properly mounted, mounting another component on the substrate, wherein the another component corresponds to a component having an odd shape and wherein the component mounted has a normal shape;

d) inspecting the another component mounted in the step d), to determine whether or not the another component mounted in the step d) is improperly mounted,

wherein the component is mounted by a high-speed mounter and the another component mounted in the step c) is mounted by an odd-shape mounter.

11. (New) The substrate inspecting method according to claim 9, wherein the step a) comprises:

a1) shining light sources of at least two different colors on a portion of the substrate corresponding to where the component should have been mounted;

a2) generating a color image from the light sources of least two different colors shone on the substrate;

a3) comparing the color image obtained in the step a2) to stored data corresponding to a proper inspection position of the component, in order to determine if the component has been mounted properly.

12. (New) The substrate inspecting method according to claim 10, wherein the inspecting step a) is performed by comparing the color image obtained in the step a2) with a first predetermined inspecting window, and wherein the inspecting step d) is performed by comparing a color image obtained during the inspecting step d) with a second predetermined inspecting window that is slightly larger in size than the first predetermined inspecting window.

13. (New) The substrate inspecting method according to claim 12, wherein the first and second predetermined inspecting windows are rectangular in shape.

14. (New) A substrate inspecting method, comprising:

a) setting an inspecting condition for substrates as either: 1) detecting a component that is missing in a mounting process of the substrates; 2) replacement date of an attracting nozzle used in the mounting process of the substrates is approaching; or 3) all of the substrates are to be inspected;

- b) read out substrate inspection data and store in a memory;
- c) if inspecting condition 2) is set, confirm that the attracting nozzle replacement date is approaching;
- d) image a substrate;
- e) if inspecting condition 3) is set, perform both mounted component inspection and component fly inspection on the substrate, and output an inspection result;
- f) if inspecting condition 3) is not set and if inspecting condition 2) is not set, which corresponds to inspecting condition 1) being set, perform only mounted component inspection on the substrate, determine if a missing component is detected, and if a missing component is detected, perform component fly inspection and output an inspection result based on both the mounted component inspection and the component fly inspection, and if a missing component is not detected, output an inspection result based only on the mounted component inspection; and
- g) if inspecting condition 3) is not set and if inspecting condition 2) is set, perform both mounted component inspection and component fly inspection on the substrate, and output an inspection result.

15. (New) The substrate inspecting method according to claim 14, further comprising, if inspecting condition 3) is not set and if inspecting condition 2) is set, determining whether a current state of a mounting system performing mounting of components on the substrate is adapted for inspecting condition 2), and if so, performing both mounting component inspection and component fly inspection on the substrate.

16. (New) The substrate inspecting method according to claim 14, wherein the image step d) is performed by shining lights of at least two different colors on the substrate and obtaining a color image from the substrate as a result.

17. (New) The substrate inspecting method according to claim 1, further comprising:

a first inspection for determining on an obtained image whether the image of a component is included in a region corresponding to the component mounting position in the first component mounting step; and

a second inspection for determining whether the image of a component mounted in the first component mounting step is included in a region corresponding to the component mounting position in the second component mounting step.

18. (New) The substrate inspecting method according to claim 1, further comprising:

a first inspection for determining on an obtained image whether the image of a component is included in a region corresponding to the component mounting position in the first component mounting step; and

a second inspection for determining whether the image of a component mounted in the first component mounting step is included in a region corresponding to the component mounting position in the second component mounting step when it is determined in the first inspection that the image of a component is not correctly included in a predetermined region.

19. (New) The substrate inspecting method according to claim 1,

wherein processing of imaging a substrate undergoing the first component mounting step and first inspection for determining whether the image of a component is included in a region corresponding to the component mounting position in the first component mounting position in the first component mounting step are executed whenever accepting the substrate under a state in which it is possible to accept the information showing the expiry date of a component-mounting implement used in the first component mounting step, and

wherein, correspondingly to input of the information, the method further comprising:

a second inspection for determining whether the image of a component mounted in the first component mounting step is included in a region corresponding to the component mounting position in the second component mounting step is executed for a predetermined number of substrates to be subsequently accepted together with the imaging and the first inspection.

20. (New) The substrate inspecting method according to claim 1,

wherein processing of imaging a substrate undergoing the first component mounting step and first inspection for determining whether the image of a component is included in a

region corresponding to the component mounting position in the first component mounting position in the first component mounting step are executed whenever accepting the substrate under a state in which it is possible to accept the information showing that a solder printed state of the substrate is deteriorated, and

wherein, correspondingly to input of the information, the method further comprising:
a second inspection for determining whether the image of a component mounted in the first component mounting step is included in a region corresponding to the component mounting position in the second component mounting step is executed for a predetermined number of substrates to be subsequently accepted together with the imaging and the first inspection.

21. (New) The substrate inspecting method according to claim 1, wherein the first component mounting step is a step of mounting a chip component.

22. (New) The substrate inspecting method according to claim 1, wherein the second component mounting step is a step of mounting an odd-shaped component.